

RESPONSE

This is a response to the Final Office Action dated October 3, 2005. The Examiner has rejected claims 1-5, 8-18 and 21-26 under 35 U.S.C. § 102(e) as being anticipated by U.S. Pat. Pub. 2004/0138835 (“Ransom”). Applicants appreciate the Examiner’s acknowledgment that claims 6, 7, 19 and 20 would be allowable if re-written in independent form.

The rejections from the Final Office Action of October 3, 2005 are discussed below. No new matter has been added. Reconsideration of the application is respectfully requested in light of the following remarks.

I. Interview Summary

On December 5, 2005, the Applicant’s Attorney, Scott Timmerman (Reg. No. 55,678), conducted a phone interview with Examiner Lau. Examiner Lau indicated that the terms of the claim, specifically “energy drivers” would need to be more specifically defined. The Examiner suggested identifying, in the specification, the definition of energy drivers.

II. § 102(e) Rejections over Ransom

The Examiner rejected claims 1-5, 8-18 and 21-26 under 35 U.S.C. § 102(e) as being anticipated by Ransom. Ransom relates to a power management architecture including multiple IED’s to manage the flow and consumption of power from the system using real time communications. In particular, in Ransom, “FIG. 2b illustrates an alternate embodiment where an IED 240 is provided which includes power management application components 290.” Ransom, ¶77.

Ransom does not disclose a method of identifying an energy driver as claimed in claims 1, 11 and 24-26. Specifically, Ransom fails to disclose the “identifying the at least one energy driver from the quantity metadata contributing to the determined at least one relationship [between the quantity metadata and energy usage data by

analyzing the quantity metadata and energy usage data]” as claimed in claim 1; “a processing module ... operative to determine at least one relationship by analyzing the quantity metadata and energy usage data, the processing module being further operable to assess the quality of the at least one relationship and identify the at least one energy driver from the quantity metadata contributing to the determined at least one relationship” as claimed in claim 11, “means for identifying the at least one energy driver from the quantity metadata contributing to the determined at least one relationship” as claimed in claim 24, “second logic ... operative to determine at least one relationship by analyzing the quantity metadata and energy usage data, the third logic being further operable to assess the quality of the at least one relationship and identify the at least one energy driver from the quantity metadata contributing to the determined at least one relationship” as claimed in claim 25, or “a processing module ... operative to determine at least one relationship by analyzing the quantity metadata and energy usage data, the processing module being further operable to assess the quality of the at least one relationship and identify the at least one energy driver from the quantity metadata contributing to the determined at least one relationship” as claimed in claim 26.

As defined in the Specification of the present application:

[a]n energy driver is some variable that affects energy usage. Various energy drivers such as occupancy, weather, internal and external environmental conditions and price are known. However, each system that uses energy is unique from the next, and as a result energy drivers are situational dependent. For example, production levels, production schedules, or process variables may be energy drivers for a factory, whereas occupancy may be an energy driver for a commercial building.

See ¶ 37 of the present Application (U.S. Pub. No. 2004/225649). Therefore, as one example, weather can operate as an energy driver because the colder it is outside in the winter, more energy will be needed to keep warm. Likewise, price can be an energy driver because people will tend to conserve energy

when the price of energy usage is high. There are numerous examples of potential energy drivers that can affect energy usage.

As shown in FIG. 2b of Ransom, Ransom discloses many different power management application software components of an Intelligent Electronic Device, such as a “data collection component 250, an automated meter reading component 253 and a billing/revenue management component 252, which may be revenue certified, a peer-to-peer power management component 257, a usage and consumption management component 258, a distributed power management component 254, a centralized power management component 255, a load management component 259, an electrical power generation management component 260, an IED inventory component 261, an IED maintenance component 262, an IED fraud detection component 263, a power quality monitoring component 264, a power outage component 265, a device management component 251, a power reliability component 256, or combinations thereof.” Ransom, ¶ 77.

The examiner cites these components 250-265 from FIG. 2 as disclosing the identification of at least one energy driver. As claimed, an energy driver is identified “from the quantity metadata contributing to the determined at least one relationship....” The components 250-265 disclosed in Ransom are all software components, which operate within an IED 240 and perform different functions based on the load data received by the IED. Ransom does not disclose that any of the disclosed software components identify energy drivers as claimed.

While Ransom suggests that the components 250-265 may collect data or identify a relationship within the collected data, Ransom fails to disclose that any of these components identifies an energy driver “from the quantity metadata contributing to the determined at least one relationship...” as claimed by Applicants. For example, the Data Collection Component 250 “enables an IED to collect and collate data.” Ransom, ¶ 79. The electrical power generation management component 260

“analyzes data received from IED's 102-109 to either minimize or maximize measured or computed values such as revenue, cost, consumption or usage by use of handling and manipulating power systems and load routing.” *Id.* IED inventory, maintenance and fraud detection components 261, 262, 263 “receive or request communications from the IED's 102-109 allowing the power management application to inventory the installed base of IED's.” *Id.* The power quality monitoring component 264 “reports alarms, alerts, warnings and general power quality status, based on the monitored parameters, directly to the appropriate user.” *Id.* These are all examples of software components of an IED, disclosed by Ransom, that either receive or process data; however, there is no teaching or suggestion that any of these components use the data to identify energy drivers as claimed.

The Examiner further cites units 511-518 of FIG. 5b as also disclosing the identification of at least one energy driver. As shown, a pulse is sent to an IED which translates the pulse to usage and consumption data that is transported over the network to power management application components which receive the data and track costs and usages. Ransom, FIG. 5b, units 511-518. While the translation of a pulse into usage and consumption data in unit 512 could be considered the identification of the amount of energy used, it is not an identification of an energy driver, i.e. what caused that usage and, thereby, that pulse to be generated in the first place. FIG. 5b, like FIG. 2b, discloses an analysis of data, but fails to disclose using that data to identify energy drivers as claimed.

Specifically, the components disclosed in Ransom do not relate to variables that affect energy usage, but instead relate to the energy usage itself. The components perform a certain function on the usage data, whereas an energy driver is an external factor or condition affecting the usage of energy. The functions performed by the components do relate to calculations or analysis of power data, but do not identify factors affecting energy usage.

As the Examiner pointed out in the Interview, Ransom further discloses a meter which “records and measures power events, power quality, current, voltage waveforms, harmonics, transients and other power disturbances . . . with the ability to detect, monitor, report, quantify and communicate power quality information.” Ransom, ¶ 49. The power quality information disclosed in Ransom is distinct from the energy driver identification from the claims. Power quality information is an analysis of the type or the quality of power that is distributed. Power quality information is determined regardless of the external factors or the environment in which the power is distributed. In other words, the external factors influencing energy usage are irrelevant to determining power quality information. As discussed above, energy drivers are external factors influencing energy usage. Regardless of the energy usage, or the factors affecting that usage, the power quality can be determined. The claims identify the external factors, which drive energy usage, whereas, the energy meters disclosed in Ransom measures and analyzes power quality information of the power being delivered. An analysis of power quality information is not an identification of energy drivers.

Accordingly, Ransom does not disclose the identification of at least one energy driver as claimed. While Ransom does disclose the identification of other devices or IED's on the network, Ransom fails to disclose the identification of energy drivers. Ransom, ¶ 131. Because Ransom fails to disclose the identification of an energy driver as claimed in independent claims 1, 11 and 24-26, these claims should be allowed. Dependent claims 2-5, 8-10, 12-18 and 21-23 were also rejected pursuant to 35 U.S.C. § 102(e) as being anticipated by Ransom. Dependent claims 2-5, 8-10, 12-18 and 21-23 should be allowed for the reasons set out above for the independent claims. Applicant therefore requests that the Examiner withdraw this rejection of these claims.

III. Conclusion

Each of the rejections in the Final Office Action dated October 3, 2005 has been addressed and no new matter has been added. Applicants submit that all of the pending claims are in condition for allowance and notice to this effect is respectfully requested. The Examiner is invited to call the undersigned if it would expedite the prosecution of this application.

Respectfully submitted,

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Date

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